

KARO ECHO Meeting
14 January 2019
Kensington Community Center

Present

Don Simon	NI6A
Hal Graboske	KK6NDF
Howdy Goudey	KE6BEE
Jay Fenton	KJ6WSS
Jerry Michaelis	K6KOP
Karen Fenton	KK6ZPM
Kevin Janes	ECFD
Larry Nagle	N/A
Larry Vanselow	KK6GIO
Marian Gade	KC6OBK
Natalie DeJarlais	KM6UCF
Scott McLean	N/A
Zenon Fortuna	AC6ZF

Agenda

Approval of the December meeting minutes Don moved; Larry seconded.

Interaction with City of El Cerrito

KARO ECHO access to El Cerrito public buildings: Howdy reported that KE was approved in the December meeting of the El Cerrito City Council to gain access to public buildings. The Arlington Clubhouse is available for membership meetings as early as February, and we need to decide when that will commence.

The post-SET gathering in February will be at the Castro Clubhouse.

Keys: Howdy can get a set of keys; there's also a lockbox on site. We can keep the keys for a while, though we'll possibly need to renew our permissions over time.

Ken Fowler technician class is scheduled at Arlington Clubhouse, El Cerrito on Wednesday evenings, beginning April 3. It will run for 10 weeks from 6:30-9:00 pm (This is distinct from the general class, which begins on Friday January 18 at El

Sobranite Methodist Church.) Ken Fowler has a website www.ko6no.com where he posts his teaching materials.

CoSponsorship: Don suggested that in the future we cosponsor classes with EBARC at the Arlington Clubhouse.

New CERT Program Director for ECFD: Kevin Janes reported that due to personnel changes in the fire department, Joe Grupalo is now in charge of CERT training. It's unclear whether Joe or Kevin will be attending the KARO ECHO meetings. Kevin has a ham license (KI6KNP); but it is unclear whether Joe does.

There was unanimous agreement that Kevin has helped the group in numerous ways, and we encouraged him to continue working with us.

Training activities

KE will co-sponsor Ken Fowler's technician license class at the Arlington Clubhouse.. Karen suggested coordinating the licensing exams for the hamcram and Fowler's class, but it won't work this time due to timing.

Possible **KE Ham Cram** in late spring/early summer. There is no set date yet, but Don expects this to be held in the early summer/late spring. We want to leave enough time for publicity in EC and Kensington. We might want to advertise in small newspapers, etc. in addition to CERT graduates. Kevin agreed to ensure that a flyer will be distributed to CERT trainees if we provide a flyer.

GMRS/FRS practicum: Don will run this -- probably at Arlington Park -- and hopes to add Glenn or Geoff as an instructor. The EC9 FRS/GMRS training in October had 5 attendees; but this training will be for all CERT areas. Don will set a date, probably in March, and Howdy will secure the room.

Organization/Funding/501(c)(3) status

Larry procured the **EIN**, and will apply for the **PO Box** and **checking account** tomorrow. He is also working on the 501(c)(3) application and 1023 EZ.

Once we are granted 501(c)(3) status, we'll be able to apply for grants and accept tax-deductible donations, Hal pointed out that mileage can be deducted from taxes and that California tax law still permits charitable deductions as before, even where federal tax law has changed.

Hal pointed out that once we are a registered nonprofit, we'll need to focus on additional fundraising. Larry suggested that we go to groups and tell them what we do, and request donations. Marian pointed out that we should pitch a particular piece of equipment or other specific project, rather than asking for general funds.

Marian has some petty cash belonging to the club at home from Costco battery rebates.

Dues were collected per December 2018 vote. Membership is \$30/year and \$40/family. Checks can be made out to KARO ECHO.

Emergency Communications

The **next SET** is scheduled for 23 Feb at 9:30 a.m. We'll send radio operators to all 14 CERT areas that we know of, in addition to one net control operator, one relay station, and two at the EOC. We'll need 17 or 18 operators, but have only 11 volunteers, and people often drop out at the last minute. Kevin believes we'll be able to gain **access to the EOC** in El Cerrito City Hall. Chief Gibson should be on duty, and Kevin will request that it be opened for us. This will allow us to confirm whether the EOC can hear people in the field and vice versa. We will possibly place a second operator in the police parking lot. The EOC has only one radio and one antenna, and it is not great for handhelds. In a disaster, we'd use Fire Station 71 or a mobile in front of the EOC at City Hall as a secondary station for overflow traffic. Marian used a handheld inside EOC without problem, but Don is skeptical if that would work adequately to all the CERT staging areas.

EOC Radio Maintenance: Hal asked who's responsible for the radio maintenance at the EOC. Kevin said it's only touched when we test it. It's well protected from the weather. Hal queries whether we should check it prior to the SET, and Kevin agreed that it was a good idea. Hal would like 2 or 3 people to be familiar with the EOC setup so that multiple people know what to do there.

SET Plans: The Feb 23 SET will simulate an earthquake at 9:00. Howdy is pre-assigned for net control. He or Jamuel, the emergency coordinator, will make assignments. This will include all CERT areas plus EOC dispatch. It will be good practice because you don't know who will actually show up in an emergency.

We'll use the **Modified Mercalli Intensity Scale**. Don provided a handout with SET information as well as the MMI scale.

Everyone will have a chance to receive and send two messages. Not all will go to the EOC this time. They will be time stamped so that everything isn't happening simultaneously.

Howdy explained that **net control** is about connecting people and getting them off the frequency. He will direct us to other frequencies to communicate.

The **emergency coordinator** has assistants and has many duties. It is a well defined position. (see: [HYPERLINK "http://www.arrl.org/files/file/Public%20Service/ECMANUAL.PDF"](http://www.arrl.org/files/file/Public%20Service/ECMANUAL.PDF) \h <http://www.arrl.org/files/file/Public%20Service/ECMANUAL.PDF>) This person makes the management decisions.

Anyone can be a **scribe**, and no license is required, Hal pointed out. We won't be doing a message center this time because we won't have CERT involvement. When CERT is involved, we don't take the initiative; we take orders from the CERT AC.

Training exercises

Jay Fenton provided a homework exercise to evaluate battery life during extended emergency usage. Question at hand: How far will your batteries take you on a five-day event with no electricity? How

many batteries will you need to get through the event? Three levels of usage:

NTL = neighborhood team leader (CERT) (heavier use than DA, for example)

SAR = search and recovery

DA = damage assessment

Standby time is easy; the issue is to calculate continuous use.

Jay suggests that we note how much battery voltage is left at the end of the SET. Good to have high capacity batteries. It's possible to get a 6000 milliamp hour battery.

Don added an easy way to calculate battery capacity and usage giving an example of transmitting on 5 watts RF output and assuming that the DC wattage is 10 watts, you divide 10 by the nominal voltage (in many handhelds this is approximately 7.5 volts). Thus we consume 1.3 amps/hour on keydown.

At a busy site assuming 75% transmitting (key down time in one hour = approximately 1000 milliamp hours (mah) in one hour (or 1 amp hour). A standard HT battery capacity is approximately 1800 mah. Hence it will conk out in less than 2 hours. An extended battery (3800 mah capacity) may last 3.5 hours). Another station with less traffic would be able to last 7-8 hours or more.

Always run minimum power necessary to affect the communication. This both saves power and eliminates possible interference. Take note of voltage drop during and after the exercise.

Jerry confirmed that EOCs have emergency generators, as do fire stations. Club houses do not.

ECFD stations do not need a battery to run the radios, Kevin confirmed; but that means that we need to provide batteries for Tassajara Park and Harding Park stations..

Don spoke about preparation for operating radios during an emergency

The SET will engage all CERT Areas which will transmit 2 messages and receive 2 formal messages.

Two operators will be assigned to the EOC

One well located station will act as relay

Check-in to the net at 9:30 AM and assignments will be made by the NCS. .

Modified Mercalli Intensity Scale: We need to use it to report damage level. Once more than two people are on the frequency, the most experienced person will become net control. Net control will keep a record of the MM reports from the various areas. If mM 7 or above, he'll dispatch people to those staging areas to observe if radio comms are needed. If there is no area coordinator for that area, you may be the sole communicator and link to the EOC. In EC9, there is a comm team and a coordinated method of sending someone to act as communicator. Several other area coordinators have a ham, but no plan how to communicate with the EOC or know procedures.

It would be ideal for all ACs to plan communications with the EOC and others. Can be GMRS or ham.

We're going to focus on CERT-to-CERT area communication, and work on self-reliance, assuming little outside aid. An excess of hams in one CERT area may be distributed to other CERT areas that

lack communicators. We will map propagation between the areas.

During the SET, it will become apparent why we change frequencies, have written messages, etc. It will start to come together. The point is to gain confidence and efficient skills, which will also allow us to lead others. It's most efficient to turn the radio over to someone who needs to communicate directly to their counterpart (tactical comms versus formal written traffic) .

Tactical call is one that you don't have to write down as a written message.

The fire department uses the term "tactical" in communication?. Line of sight, person to person -- not via repeater. Short range, simple frequency.

Howdy also mentioned the "tactical call sign." Rather than an FCC sign, they could be called by their function or group. Kensington uses KEN1, KEN2, etc. Another example of tactical call sign: El Cerrito High Red Cross Shelter. These are assigned by net control. PG&E and Fire Departments can talk to each other on their radios, as well as other emergency services.

The SET will also make use of general bulletins/announcements stating requests/needs for resources. Another area will announce requests for needed resources. These kind of traffic would be neither written or tactical..

EC public works has its own radio system, but they may not be able to talk to other agencies, departments, and their comm system may be overloaded. Thus we may need to assign ops as shadows in order for them to reach other agencies or city departments.

Other business.

Jerry reminded us that we are required to state our call signs every ten minutes, and requests that net control remember to do this. He also requested that when asking for relays, net control provide plenty of opportunity for additional relays before continuing with other business.